FEB 2 3 70	N E		·	
AN THAD	xaminer Initial	U.S. Patent Document No.	Name of Patentee or Applicant	Date of Publication
:- 108×	/KP/	4,133,004	Fitts	01/02/1979
		4,136,950	Labrum et al.	01/30/1979
		4,1418,062	Kamin	04/03/1979
		4,160,998	Kamin	07/10/1979
		4,163,357	Grieve et al.	08/07/1979
		4,163,991	Burrig	08/07/1979
		4,173,402	Hosike et al.	11/06/1979
		4,183,013	Agrawala et al.	01/08/1980
		4,185,298	Billet et al.	01/22/1980
•		4,187,519	Vitels et al.	02/05/1980
		4,198,653	Kamin	04/15/1980
		4,214,265	Olesen	07/22/1980
•		4,219,845	Gibbons et al.	08/26/1980
		4,219,847	Pinkney et al.	08/26/1980
		4,240,109	Michael et al.	12/16/1980
		4,245,243	Gutjahr et al.	01/13/1981
		4,249,207	Hosman et al.	02/03/1981
l l		4,249,212	Ito et al.	02/03/1981
		4,257,063	Loughry et al.	03/17/1981
		4,258,351	Shigeta et al.	03/24/1981
		4,298,858	Romanski	11/03/1981
		4,317,130	Brown	02/23/1982
		4,337,481	Mick et al.	06/29/1982
		4,364,113	Sengebusch et al.	12/14/1982
		4,395,699	Sternberg	07/26/1983
	LV	4,408,224	Yoshida	10/04/1983



Examiner Initial	U.S. Patent Document No.	Name of Patentee or Applicant	Date of Publication
/KP/	4,410,910	Andes	10/18/1983
	4,414,685	Sternberg	11/08/1983
	4,433,325	Tanaka et al.	02/21/1984
·	4,433,438	Couturier	02/21/1984
	4,435,835	Sakow et al.	03/06/1984
	4,449,144	Suzuki	05/15/1984
	4,450,482	Ackerman	05/22/1984
	4,455,550	Iguchi	06/19/1984
	4,458,266	Mahoney	07/03/1984
	4,479,145	Azuma et al.	10/23/1984
	4,490,851	Gerhart et al.	12/25/1984
	4,493,420	Dennis	01/15/1985
	4,506,765	Payne et al.	03/26/1985
	4,520,343	Koh et al.	05/28/1985
	4,520,504	Walker et al.	05/28/1985
	4,543,567	Shiratan et al.	09/24/1985
	4,554,459	Tsutsumi et al.	11/19/1985
	4,555,724	Enriquez	11/26/1985
	4,556,900	Willis	12/03/1985
	4,565,029	Kornbrekke et al.	01/21/1986
	4,569,078	Zuk	02/04/1986
	4,574,393	Blackwell et al.	03/04/1986
	4,577,344	Waslen et al.	03/18/1986
	4,589,030	Klay	05/13/1986
	4,589,139	Hada et al.	05/13/1986
V	4,626,891	Achiha	12/02/1986



Examiner Initial	U.S. Patent Document No.	Name of Patentee or Applicant	Date of Publication
/KP/	4,626,908	Tani	12/02/1986
	4,639,767	Suzuki	01/27/1987
	4,641,120	Bonfig et al.	02/03/1987
	4,641,356	Sternberg	02/03/1987
	4,653,109	Lemelson et al.	03/24/1987
	4,662,479	Tsuji et al.	05/05/1987
	4,665,554	Sternberg	05/12/1987
	4,669,218	Kornbrekke et al.	06/02/1987
	4,679,077	Yuasa et al.	07/07/1987
	4,680,704	Konicek et al.	07/14/1987
	4,692,806	Anderson et al.	09/08/1987
	4,694,329	Belmares-Sarabia et al.	09/15/1987
	4,698,937	Kornbrekke et al.	10/13/1987
	4,709,264	Tamusa et al.	11/24/1987
	4,736,252	Nakagawa et al.	04/05/1988
	4,737,847	Araki et al.	04/12/1988
	4,739,401	Sacks et al.	04/19/1988
	4,742,549	Roschier	05/03/1988
	4,760,607	Sternberg et al.	07/26/1988
	4,779,131	Matsumoto et al.	10/18/1988
	4,783,833	Kowubata et al.	11/08/1988
	4,794,248	Gray	12/27/1988
	4,685,145	Schiller	08/04/1987
	4,685,146	Fenster et al.	08/04/1987
	4,799,243	Zepke	01/17/1989
	4,807,034	Takavch et al.	02/21/1989



Examiner	U.S. Patent	Name of Patentee	D
Initial	Document No.	or Applicant	Date of Publication
/KP/	4,823,010	Kornbrekke et al.	04/18/1989
	4,825,393	Nishiya	04/25/1989
	4,831,641	Niemi	05/16/1989
	4,839,648	Beucher et al.	06/13/1989
	4,845,761	Cate et al.	-07/04/1989
	4,847,772	Michalopoulos et al.	07/11/1989
	4,849,906	Chodos et al.	07/18/1989
	4,858,156	Martin	08/15/1989
	4,860,371	Matsuyama et al.	08/22/1989
	4,868,651	Chou et al.	09/19/1989
	4,871,948	Nelson	10/03/1989
	4,874,063	Taylor	10/17/1989
	4,876,728	Roth ,	10/24/1989
	4,881,270	Knecht et al.	11/14/1989
	4,884,136	Ninomiya et al.	11/28/1989
	4,906,940	Greene et al.	03/06/1990
	4,908,704	Fujioka et al.	03/13/1990
	4,920,572	Sugita et al.	04/24/1990
	4,924,310	von Brandt	05/08/1990
	4,924,416	Sasao	05/08/1990
	4,928,176	Schmidt et al.	05/22/1990
	4,931,864	Kawamura et al.	06/05/1990
	4,937,878	Lo et al.	06/26/1990
	4,947,353	Quinlan, Jr.	08/07/1990
	4,951,137	Kisov et al.	08/21/1990
L_V_	4,959,714	Lo et al.	09/25/1990



Examiner Initial	U.S. Patent Document No.	Name of Patentee or Applicant	Date of Publication
/KP/	4,962,419	Hibbard et al.	10/09/1990
	4,967,083	Kornbrekke et al.	10/30/1990
	4,969,202	Groezinger	11/06/1990
	4,974,077	Kusaba	11/27/1990
	4,975,970	Zettel et al.	12/04/1990
	4,975,973	Kasane et al.	12/04/1990
	4,979,136	Weiman et al.	12/18/1990
	4,984,071	Yonezawa	01/08/1991
	4,985,618	Inada et al.	01/15/1991
	4,987,602	Brunner et al.	01/22/1991
	4,991,092	Greensite	02/05/1991
	5,001,557	Begle	03/19/1991
	5,008,739	D'Luua et al.	04/16/1991
· · · · · · · · · · · · · · · · · · ·	5,010,578	Siener et al.	04/23/1991
	5,018,218	Peregrim et al.	05/21/1991
	5,022,062	Annis	06/04/1991
	5,023,809	Spackman et al.	06/11/1991
	5,031,227	Raasch et al.	07/09/1991
	5,032,905	Koga	07/16/1991
	5,034,986	Karmann et al.	07/23/1991
	5,047,851	Sauerwein et al.	09/10/1991
	5,052,045	Peregrim et al.	09/24/1991
	5,067,014	Bergen et al.	11/19/1991
	5,075,632	Payne et al.	12/24/1991
	5,091,967	Ohsawa	02/25/1992
V	5,099,324	Abe	03/25/1992



Examiner Initial	U.S. Patent Document No.	Name of Patentee or Applicant	Date of Publication
/KP/	5,101,440	Watanabe et al.	03/31/1992
	5,103,305	Watanabe	04/07/1992
	5,115,477	Groezinger	05/19/1992
	5,119,442	Brown	06/02/1992
	5,121,201	Seki	06/09/1992
	5,134,472	Abe	07/28/1992
	5,134,661	Reinsch	07/28/1992
	5,140,649	Kageyama	08/18/1992
	5,142,152	Boiucaner	08/25/1992
	5,149,921	Picado	09/22/1992
	5,150,421	Morishita et al.	09/22/1992
	5,150,426	Bauh et al.	09/22/1992
	5,151,945	Lee et al.	09/29/1992
	5,159,646	Kumagai	10/27/1992
	5,161,107	Mayeaux et al.	11/03/1992
	5,162,902	Bell et al.	11/10/1992
	5,181,254	Schweizer et al.	01/19/1993
	5,182,776	Suzuki et al.	01/26/1993
	5,182,778	Rudek et al.	01/26/1993
	5,187,747	Capello et al.	02/16/1993
	5,212,740	Pack et al.	05/18/1993
	5,239,596	Mahoney	08/24/1993
	5,241,608	Fogel	08/31/1993
	5,243,663	Kudoh	09/07/1993
	5,243,668	Kitamura et al.	09/07/1993
<u></u>	5,247,366	Ginosar et al.	09/21/1993



Examiner Initial	U.S. Patent Document No.	Name of Patentee or Applicant	Date of Publication
/KP/	5,249,241	Silverman et al.	09/28/1993
	5,257,209	Maskandey	10/26/1993
	5,258,586	Suzuki et al.	11/02/1993
	5,263,098	Hovikami	11/16/1993
	5,271,064	Dhawan et al.	12/14/1993
	5,281,964	Iida et al.	01/25/1994
	5,282,337	Duhame et al.	02/01/1994
	5,283,573	Takatov et al.	02/01/1994
	5,289,520	Pellegrino et al.	02/22/1994
	5,291,313	Kim	03/01/1994
	5,294,986	Tsuji et al.	03/15/1994
	5,296,852	Rathi	03/22/1994
	5,298,697	Suzuki et al.	03/29/1994
<u>.</u>	5,300,739	Bittner	04/05/1994
	5,305,395	Mahoney et al.	04/19/1994
	5,311,598	Bose et al.	05/10/1994
	5,313,295	Taniguchi et al.	05/17/1994
	5,315,389	Izawa et al.	05/24/1994
	5,319,547	Krug et al.	06/07/1994
	5,353,021	Toyamas	10/04/1994
	5,359,674	van der Wal	10/25/1994
	5,376,962	Zorten	12/27/1994
	5,387,768	Izard et al.	02/07/1995
	5,387,930	Toh ·	02/07/1995
	5,402,118	Aoki	03/28/1995
L V	5,406,501	Florent	04/11/1995

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Examiner Initial	U.S. Patent Document No.	Name of Patentee or Applicant	Date of Publication
/KP/	5,410,418	Yonezawa	04/25/1995
	5,420,971	Westerink et al.	05/30/1995
	5,426,517	Schwartz	06/20/1995
·	5,426,685	Pellegrino et al.	06/20/1995
	5,432,528	Ritter	07/11/1995
	5,436,984	Saskkinen et al.	07/25/1995
	5,438,360	Edwards	08/01/1995
	5,450,502	Eschbach et al.	09/12/1995
	5,483,351	Mailloux et al.	01/09/1996
	5,490,218	Krug et al.	02/06/1996
	5,500,904	Markaudey et al.	03/19/1996
	5,509,082	Toyama et al.	04/16/1996
	5,511,133	Shimizu et al.	04/23/1996
	5,519,784	Velmeulen et al.	05/21/1996
	5,528,703	Lee	06/18/1996
	5,537,224	Suzuki et al.	07/16/1996
	5,544,258	Levien	08/06/1996
	5,551,533	Ng	09/03/1996
	5,555,318	Ito et al.	09/10/1996
	5,572,595	Kumagai et al.	11/05/1996
	5,581,370	Fuss et al.	12/03/1996
	5,581,625	Connell	12/03/1996
	5,590,217	Toyama	12/31/1996
	5,592,567	Kilger	01/07/1997
	5,596,418	Strolle et al.	01/28/1997
<u> </u>	5,598,338	Tanigrchi et al.	01/28/1997



Examiner Initial	U.S. Patent Document No.	Name of Patentee or Applicant	Date of Publication
/KP/	5,604,822	Pearson et al.	02/18/1997
	5,606,432	Ohtsuka et al.	02/25/1997
	5,609,152	Pellegrino et al.	03/11/1997
	5,612,928	Haley et al.	03/18/1997
	5,617,484	Wada et al.	04/01/1997
	5,621,868	Mizutani et al.	04/15/1997
	5,625,709	Kasdon	04/29/1997
	5,631,975	Riglet et al.	05/20/1997
	5,631,984	Graf et al.	05/20/1997
	5,640,468	Hsu	06/17/1997
	5,657,403	Wolff et al.	08/12/1997
	5,668,890	Winkelman	09/16/1997
	5,673,355	Strolle et al.	09/30/1997
	5,675,624	Relihan et al.	10/07/1997
	5,682,438	Kojima et al.	10/28/1997
	5,684,898	Bendy et al.	11/04/1997
	5,687,249	Kato	11/11/1997
	5,687,251	Erler et al.	11/11/1997
	5,701,163	Richards et al.	12/23/1997
	5,727,080	Cox et al.	03/10/1998
	5,734,746	Jaspers	03/31/1998
	5,740,801	Branson	04/21/1998
	5,748,773	Tashiro et al.	05/05/1998
	5,748,802	Winkelman	05/05/1998
	5,756,981	Roustaei et al.	05/26/1998
	5,757,286	Jonsson et al.	. 05/26/1998



Examiner Initial	U.S. Patent Document No.	Name of Patentee or Applicant	Date of Publication
/KP/	5,761,326	Brady et al.	06/02/1998
	5,771,485	Echigo	06/23/1998
	5,774,569	Waldenmaier	06/30/1998
	5,799,100	Clarke et al.	08/25/1998
	5,799,106	Mooney et al.	08/25/1998
	5,802,208	Podilchuk et al.	09/01/1998
	5,808,697	Fujimura et al.	09/15/1998
	5,809,162	Csipkes et al.	09/15/1998
	5,822,453	Lee et al.	10/13/1998
	5,825,922	Pearson et al.	10/20/1998
	5,832,111	Florent	11/03/1998
	5,832,118	Kim	11/03/1998
	5,832,139	Battesman et al.	11/03/1998
	5,835,613	Breed et al.	11/10/1998
	5,835,618	Fang et al.	11/10/1998
	5,835,638	Rucklidge et al.	11/10/1998
	5,838,299	Smith et al.	11/17/1998
	5,838,758	Krug et al.	11/17/1998
	5,844,565	Mizutani et al.	12/01/1998
	5,845,000	Breed et al.	12/01/1998
	5,845,007	Ohashi et al.	12/01/1998
	5,847,755	Wixson et al.	12/08/1998
	5,848,179	Braet	12/08/1998
	5,848,190	Kleehamer et al.	12/08/1998
	5,854,851	Bamberger et al.	12/29/1998
V	5,857,029	Patel	01/05/1999



Examiner Initial	U.S. Patent Document No.	Name of Patentee or Applicant	Date of Publication
/KP/	5,859,698	Chou et al.	01/12/1999
	5,862,254	Kim et al.	01/19/1999
-	5,872,857	Chudos et al.	02/16/1999
	5,875,264	Carlstrom	02/23/1999
	5,877,819	Branson	03/02/1999
	5,883,969	Le Gouzouguec et al.	03/16/1999
	5,890,808	Neff et al.	04/06/1999
	5,892,917	Myerson	04/06/1999
	5,901,241	Koljonen et al.	05/04/1999
	5,907,643	Adach	05/25/1999
	5,937,090	Kim	08/10/1999
	5,946,404	Badsh et al.	08/31/1999
	5,946,407	Bamberger et al.	08/31/1999
·	5,949,918	McCaffrey	09/07/1999
	5,956,435	Buzug et al.	09/21/1999
	5,963,276	Inbar	10/05/1999
	5,970,164	Bamberger et al.	10/19/1999
	5,974,169	Bachelder	10/26/1999
	5,978,502	Ohash	11/02/1999
·	5,978,507	Shackleton et al.	11/02/1999
	5,982,424	Simerly et al.	11/09/1999
	5,982,917	Clarke et al.	11/09/1999
V	5,999,660	Zorin et al.	12/07/1999
	6,002,525	Poulo et al.	12/14/1999
	6,002,782	Dionysinu	12/14/1999
Ψ	6,020,931	Bilbrey et al.	02/01/2000



Examiner Initial	U.S. Patent Document No.	Name of Patentee or Applicant	Date of
/KP/	6,041,138	Nishida	Publication
			03/21/2000
	6,055,334	Kato	04/25/2000
	6,067,366	Simanovsky et al.	05/23/2000
	6,069,971	Kanno et al.	05/30/2000
	6,075,871	Simanovsky et al.	06/13/2000
	6,075,890	Park	06/13/2000
	6,081,618	Naoi et al.	06/27/2000
	6,088,468	Ito et al.	07/11/2000
	6,101,294	McCaffrey et al.	08/08/2000
	6,104,763	Limberg	08/15/2000
	6,111,607	Kampyama	08/29/2000
	6,111,974	Hiraoglu et al.	08/29/2000
	6,111,980	Sano et al.	08/29/2000
	6,118,892	Williams	09/12/2000
	6,134,339	Luo	10/17/2000
	6,134,373	Strolle et al.	10/17/2000
	6,137,893	Michael et al.	10/24/2000
	6,148,103	Nenonen	11/14/2000
	6,154,560	Cothren et al.	11/28/2000
	6,157,373	Rago	12/05/2000
	6,163,621	Paik et al.	12/19/2000
	6,201,616	Sasanuma et al.	03/13/2001
	6,219,447	Lee	04/17/2001
$oxed{V}$	6,246,450	Inbar	06/12/2001



Examiner Initial	U.S. Patent Document No.	Name of Patentee or Applicant	Date of Publication
/KP/	6,246,827	Strolle et al.	06/12/2001
	6,255,650	Warner et al.	07/03/2001
	6,259,472	Park	07/10/2001
	6,266,102	Azuma et al.	07/24/2001
	6,272,246	Taka	08/07/2001
	6,320,981	Yada	11/20/2001
	6,373,533	Kawabata et al.	04/16/2002
	6,392,764	Eschbach et al.	05/21/2002
	6,393,148	Bhaskar	05/21/2002
	6,415,049	Yanagita et al.	07/02/2002
Ψ.	6,421,097	O'Rourke	07/16/2002

FOREIGN PATENT DOCUMENTS

	Foreign Patent Document					
Examiner Initial	Office	Number	Kind	Name of Patentee or Applicant	Date of Publication	T

OTHER PRIOR ART OR NON-PATENT LITERATURE DOCUMENTS

Examiner Initial	(including Author (in capital letters), Title of the article, Title of the item, Date, Pages, Volume-Issue number, Publisher, City and/or Country where published.)	Т
	·	

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